If we could have prevented a disaster, but didn't, who will be to blame?

Twenty-five years ago, in June 1996, a catastrophic rupture of the Colonial Pipeline in southern Greenville County released a million gallons of diesel fuel to the Reedy River. The Greenville News front-page headline, "Now it's called the River of Death," ominously foretold the spill's impacts, as it literally killed 22 miles of the Reedy. After years of investigation, fines, and litigation, the State settled its civil claims against Colonial for negligence of its pipeline and environmental damages. The State's action resulted in a Reedy River Restoration Plan and a fund to help the river recover, and to protect it going forward.

The State's plan, established in 1999, provided the opportunity for a small group of conservationists, including myself, to bring attention to what we believed was a vastly greater looming threat to the Reedy. We advised the Governor, and the directors of SCDHEC and SCDNR, that without thoughtful and timely action, the impacts of a catastrophic failure of the Lake Conestee Dam, built in 1892, would by far eclipse those of the Colonial spill.

Our intrepid group requested funds to purchase the lake property and the dam, and importantly, we asked for assistance from SCDHEC to help find a pathway to their responsible care. Our plea emphasized, "The singular compelling justification for the 'Conestee Project' is to protect the Reedy River." Grasping the serious risk posed by the neglected dam, the State's restoration trustees enthusiastically approved our request. The promise of averting another environmental disaster was embraced as a good investment of a tiny fraction of the State's settlement funds.

That deal had to overcome formidable hurdles, and involved a multitude of agencies, conservation organizations, and private parties. Numerous critical commitments were made to include conducting a series of studies to thoroughly evaluate contamination in the sediments of the long-disparaged and little-understood Lake Conestee, and to assess the highly suspect condition of the dam. Insights from these studies would hopefully lead to a long-term care plan for the lake and the dam. Creating a nature preserve from the old lake, if proven safe and viable, would provide a wonderful collateral benefit, but that was not the primary objective or the driving mission of the 'Conestee Project.'

For decades prior to the Clean Water Act of 1972, the Reedy carried a heavy burden of industrial pollution, one hugely disproportionate to its size. **Regulators and environmentalists alike knew the Reedy as the most polluted river in the state.** A 1969 fisheries report characterized it as "devoid of life." Thankfully, the Reedy River has substantially recovered, even from the fuel spill. But, the Reedy still has far to go to be considered clean, healthy, fishable, and suitable for recreational contact.

In late 2000, we began rigorous assessments of the nature and extent of contamination in the old 135-acre reservoir. In partnership with SCDHEC and other agencies, we exhaustively studied the Lake Conestee Site, and then the old dam. Follow-up and monitoring work continues even now.

The results of those early studies were not quite alarming, but they were very troublesome. While Greenville had prospered on the back of the Reedy for more than a century, the unwanted wastes of its industries had been flushed down the river, a dark legacy of the pre-regulatory past. Where the river slowed, at the first impoundment downstream from Greenville, contaminant-laced sediments accumulated. Our exhaustive sampling and analysis revealed that **the millions of tons of sediment trapped in the former lake were thoroughly infused with a remarkably diverse "chemical stew" of 20th-century industrial contaminants. Numerous hazardous substances were found, in nearly every sample, and in worrisome concentrations. Many of these compounds have environmental and human health effects so significant they are now highly regulated, and several were banned altogether in the 1970s. Reconstructing**

HRI – Environmental Consultants

Ex. 6 Personal Privacy (PP)

the story, we realized the contaminants had all been transported down the river from hundreds of locations in the 65 sq.mi. watershed upstream, including several notorious hazardous waste sites. We now understood, Greenville's dregs had come to rest in Lake Conestee, and they could not be ignored.

By 2004, it was clear the threat we anxiously foresaw back in 1999 had been grossly understated. Because of the scale and complexity of this Site, we agreed with SCDHEC, the best remedy for managing these contaminated sediments, and mitigating the risks to humans and the environment, was to contain them in place behind the dam, minimize their disturbance, and allow cleaner sediments to cap the site naturally over time. A comprehensive remediation of the Site would simply be prohibitively costly.

Unfortunately, that site management strategy depended on the integrity of an antiquated dam, steadily disintegrating over time. When it was built 129 years ago, its simple purposes were to generate power and provide water for Reedy River Manufacturing Company (Conestee Mill). Extensive studies and numerous dam experts have now verified the Lake Conestee Dam is in "Poor" condition, is woefully deficient compared to current engineering standards, and it has no acceptable factor of safety. It is more vulnerable to failure with every day that passes.

Lake Conestee presents us with a large, complex, and serious repository of enormous quantities of contaminants of concern. It will require perpetual care. The "ticking time bomb" that is the dam does not begin to fulfill the standard of care necessary to protect the downstream Reedy River. And, the seriousness of this Site is multiplied by the fact that an urban river runs through it. As a result, this Site is far more perilous than any other hazardous waste site in Greenville County. Both SCDHEC and U.S. EPA continue to closely monitor and assess the Lake Conestee situation.

So, over two decades after we began, the **Lake Conestee Dam is confirmed to be a very real and present danger. It is a disaster waiting to happen,** and its age and condition render it beyond rehabilitation. After four engineering studies, and thorough examination of every alternative, we now know, without question, exactly what must be done. **A new containment structure, a modern dam, must be constructed.** This is the most cost-effective and practicable solution to contain these toxin-laced sediments for the next 100+ years.

We all agree – a strong, secure, and durable Lake Conestee Dam is critical to protecting the Reedy River, and potable water supplies and natural resources downstream. Our Reedy River stakeholder community has a choice to make. We can work together and choose to avert certain disaster. Or, we can let this essential piece of infrastructure, now more vital than ever, continue to crumble.

Declarations of "it is not my problem," and deferring to others to "take care of it," are proven pathways to certain failure. We all own this challenge. The call to action is clear. We must all step up, upstream and downstream partners, local, state, and federal agencies, responsible polluters, and other stakeholders, with commitment, resourcefulness, and investment. We must find the resources to do this right, and do it now. Alternatively, we can continue in blissful disregard, and spend a lot more, later on, picking up the pieces. Just ask Colonial about the cost of neglecting one's infrastructure.

Dave Hargett, Ph.D., is the co-founder and former executive director of the Conestee Foundation, which is the owner of Lake Conestee Nature Preserve. He has been continuously involved in the 'Conestee Project' and on the issues presented in this paper since the mid-1990s. He has been the principal investigator and/or project director on all studies conducted on the Lake Conestee Site and Dam since 2000. He is an independent consultant on water resources and environmental issues. This white paper is a work product of HRI.

Í	Ex. 6 Personal Privacy (PP)
	HRI – Environmental Consultants